

A Work Project presented as part of the requirements for the Award of a Master Degree in
Management from the NOVA – School of Business and Economics.

**How to define, illustrate and evaluate design and architectural projects without
commercial value:**

A practical example of the cultural consultant experientia and the project Amorim 2020

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A Project carried out on the Master in Management Program, under the supervision of:

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4th of January 2019

Abstract

Up until now design and architectural projects without commercial value have been carried out by larger corporations that have had enough resources to expand in these areas with long-term perspectives and become cultural mediators. However, as a result of the growing trend to evolve from philanthropic donations to strategic CSR, intermediary smaller organisations have emerged as cultural consultants, providing tailored solutions aligned with the vision and the needs of a company. Given the author's internship experience in the cultural consultant *experimenta*, this thesis aims to define, illustrate and suggests evaluation methods for design and architectural projects as well as provide a practical exemplification with *Amorim 2020*. Acknowledging the current complex situation in terms of value creation measurement of these kind of projects, but considering its relevance, a broader framework based on the SROI methodology is finally proposed, together with recommendations and potential lines of actions on its application.

Keywords

Strategic Corporate social responsibility, value creation, SROI, design and architectural projects

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1. Introduction

The author of this paper was called to work as a Production Assistant at *experimenta design's* Production Department for a 6 months internship, contributing to the organization, development and management of its ongoing and new projects. Experimenta is a Portuguese non-profit organisation based in Lisbon, a knowledge production unit and a content diffuser in the areas of design, architecture and project culture. It has been responsible for the organisation of Lisbon Biennale for almost 20 years (1999-2017), helping to evolve the design culture in Portugal and bringing around 1.130.450 visitors in its capital (Domusweb.it, 2017)^[1]. Thereafter experimenta has decided to change its *modus operandi*, switching from being a cultural event organiser to serving as a cultural consultant to businesses which are interested in undertaking strategic investments in the areas of art, design and architecture. In particular, the focus of the collaboration between the author and experimenta was the new project with the renown Portuguese cork company *Amorim*, called *Amorim 2020* (code name), already under way now but that will eventually take place in 2020 as a public urban installation in New York. In these 2 years of preparation experimenta will be responsible to frame, produce and communicate all the project's design and architectural outputs; in other words, it will be in charge to follow the production of the design pieces, to plan the exhibition and to coordinate the communication campaign. The tasks that the author was mainly involved during this time span were related to the budget documentation structure, a fundamental step in the projects' production since it represents a phase during which the project itself is better defined and trade-offs are identified. The idea of this Work Project took form while developing budgets that only involved cash outflows and reflecting on what could be the non-monetary impact generated as well as how to measure it. Indeed, the design and architectural projects taken into account in the following analysis are those for which a commercial value can't be traced, for example as public installations or exhibition of unique pieces. By commercial value is meant the actual

price a certain product or service is worth, established by jointly assessing production costs, its overall market value and the perceived value of the targeted group of customers (BusinessDictionary.com, 2018)^[2]. Therefore, products or services without a commercial value are exempt from any price computation, given the fact they are not meant to be sold; however, this doesn't exclude that their market shouldn't be analysed and that a targeted audience shouldn't be identified. In fact, they can still generate some other kind of value for the investor, in this case Amorim. The ultimate purpose of this Work Project is to eventually provide a useful framework to *experimenta* and similar organisations in order to further engage possible investing companies by making them more aware of the results that can be achieved.

2. Design and architectural projects and their cultural impact

2.1 Definition and differences between art, design and architecture

In order to better understand the content of the following Work Project it is important to firstly provide a description of the main differences between art, design and architecture that certainly have many areas of intersection but that shouldn't be confused. Maria Khan, designer from Simon Fraser University, states that "*Art derives from our external and internal experiences, from how we view the world and what we want to vocalize. Design, on the other hand, is taking a problem and finding solutions for it.*" In other words, design is a human centered discipline meant to fulfil a need of a final user who is not addressed in the art world; art doesn't have any function except the artist's willingness to express the self and challenge the viewer (*Samim and Fardi, 2016*)^[3]. Lastly, architecture can be defined as the design activity of the architect that takes place either on a macro-level (urban design, landscape architecture) or on a micro-level (construction details and furniture). As their economic value is concerned, an art piece attains a commercial value only when and whether sold to a buyer, while a design or architectural piece should theoretically always attain one, corresponding to the price the targeted final user

is willing to pay. However, there are some graphic or product design pieces and architectural works that follow more closely the art business model than others, which makes very blurred to distinguish the line between the disciplines. This new intersection has given birth to design works that account for a final user but that are not going to be sold. Nevertheless, it can be stated that all the three disciplines eventually fall in the broader category of cultural products (Snowball, 2018)^[4], by providing the raw materials for the formation of identities, working for the construction of social cohesion and fostering innovation and creativity. They have the power of creating engaging encounters that encourage people to visit, gather and socialise. Either meant or not to be sold, their economic influence plays an important role in a time when the growth of leisure occasions, education and disposable income has led to an increasing consumption of leisure and cultural goods. Indeed, we are witnessing a rising international interest in the potential of cultural and creative industries to drive sustainable development and generate inclusive job opportunities (Snowball, 2018)^[5]. This concept dates back to 2004 to Richard Florida's book "*The Rise of the Creative Class*" which reports that strategies promoting creativity and artistic assets has blossomed in different regions as means for attracting young and creative professionals. Now, more than 10 years into this experiment, there are enough data to say that artistic clusters are an important variable that millennials value when for example looking for a place to live (Points, 2017; Florida, 2015)^[6].

The present day relevance of design and architecture

Creativity has never been more important than today: the global economy is stuttering and disruptive technologies keep on challenging established business models. Design is one of the most important creative disciplines within the context of the 21st Century, a problem-solving methodology that integrates aesthetics and ethics, economy and culture, sociology and engineering. Since it is human-centered it has a tremendous capacity to create solutions for a fast-changing society, where flexibility and adaptability are paramount. Thanks to design:

- The people's needs, technology possibilities, and business success can be put together
- Knowledge can be created and shared
- Innovation and economic development can be promoted.

The design methodology has also been applied in architecture, by stressing the importance of minimization of negative environmental impact and maximisation of connection between people and nature, arising the social responsibility that architectural works embody because of the influence that can have on people's life. For the purposes of this research, design and architectural projects can comprise physical outputs (installations, graphics, etc..) as well as activities, laboratories or classes that have educational or social objectives, and where artistic and design-thinking methodologies are leveraged to reach them. To fully take meaning of this kind of projects a more thorough description of the 7 phases that constitute them is given in the next section.

2.2 Project framework

The British *Contemporary Art Society* outlines a remarkable guide (British Property Federation and researched by the Contemporary Art Society, 2017)^[7] concerning how best to work with designers, artists and architects to develop cultural strategies and art programmes so that optimum results are achieved and risks are minimized along the way. Such guide illustrates the main 7 phases of each project:

1) Briefing: Preparing the brief is crucial since it should identify a definite proposal with an adequate budget to install an excellent work. The brief is a set of criteria that must be agreed and should enable all those involved to understand as clearly as possible the aims of the commission and its timeline; it should be accompanied by statements of significance and needs which acknowledge the specific context and the intention of the new work. Figure I shows graphically the main points which have to be discussed at this stage.



The outcome of this first phase is the *Booklet*, typically a small, thin book that provides all the information mentioned above. Here the indications over dimensions, materials, the budget and the programme for the production and fabrication are more or less thoroughly presented. The more the Booklet is detailed, the less the designer's creativity will be free, but the more the project can be evaluated (together with its costs and impacts).

2) Designers, architects and artists' selection: choosing the right creative mind makes a significant impact on the success of the project since a bit of delicate matchmaking can make all the difference. Understanding the 'fit' for the commission is where art expertise can be most valuable - which might require an art advisor, curator or cultural consultant: is a big name required to add notoriety, or is this an opportunity to unearth an emerging talent?; Is a radical creative approach desired or a safer known quantity? Each artist brings its own way of working (British Property Federation and researched by the Contemporary Art Society, 2017)^[7].

3) Development of a proposal: the designers, artists and architects have to be briefed, given access to the site, provided with all the context information and liaised with relevant parties and project teams when possible. All these steps are important to support the development of concept proposals, normally outlined with detailed visualisations/models, text describing ideas, research and key concepts. It is recommended to enter into a two-stage contract with the designers so that their fee payments are made upon completion of key milestones previously

defined in the Booklet. This approach provides security to the commissioner or cultural consultant by linking payment to key deliveries (O'Donnell and Boyle, 2008)^[8].

4) Fabrication and installation: following the approval of the artwork proposal, the fabrication and on-site installation phase begins. This might include consultation with design teams, structural engineers, materials specialists, planning authorities and specialised fabricators. Specific permissions and safety might be needed.

5) Ongoing-maintenance: it can be necessary to plan the ongoing maintenance of the outputs produced in case they will be permanent.

6) Communication campaign accompanying the whole project: it consists in organized communication activities involving traditional and digital media. Such activities might involve newsletters to the cultural consultant's contacts database, communication one-to-one, social media updates, participation to events with wide reach in the cultural area, PR, editorial coverage, design of posters/leaflets, brand image and finally the creation of different communication platforms (books, dedicated websites, documentaries, mobile Apps).

7) Effective project management throughout the whole program: a transversal phase which has to ensure that the milestones are met during the whole process, changes are managed effectively and key stakeholders are engaged in delivering the work.

Given the rising relevance of design and architecture, some companies have decided to undertake investments in these fields as *business expansion* strategies or *corporate sponsorships* actions as explained in sections 2.3 and 2.4 below.

2.3 Business expansion

Business expansion into design and architecture consists into creating specific business units responsible to develop projects in these fields. These business units are directly and strategically controlled by the parent company so that the activities and the outputs generated

can be leveraged to benefit the parent company's products or services in a broader long-term strategy. There are mainly 2 identifiable benefits:

1. Business expansion can serve as a strong showcase of corporate values and mission given the full control over the cultural program developed (which can expand among performances, exhibitions, projections, concerts, conferences, installations, etc.). The programs reinforce what the parent company is doing by laterally echoing and supporting its activities from a different perspective.
2. If *expanding* and *sponsoring* strategies might not register significant changes for the final users, they have different impacts on the personnel. Indeed, the long-term resources invested in these areas can be strategically used to set up HR programs to engage workers, recording benefits on their morale and fuelling innovation inside the company.

Such first methodology of expansion is preferably chosen by companies which aim to be engaged with design and architectural projects for a longer time span, since it requires an investment in highly specific resources to eventually emerge as a cultural producer and mediator. Recent meaningful examples are those of the fashion houses *Luis Vuitton* and *Prada* which gave birth to their Foundations thanks to multimillionaire investments, respectively in the Parisian Bois de Boulogne, and in the Italian cities of Venice and Milan. Louis Vuitton Foundation counted more than 1.400.000 visitors in 2017 and provided the venue for its women's 2015 fashion shows (Fondation Louis Vuitton Press Kit, 2014)^[9]. Foundation Prada 2017 report states that "*Art, architecture, literature and film are just some of the cultural disciplines that represent continuous sources of inspiration for the Group. Interaction with these apparently distant cultural spheres has led to a number of special projects that, over the years, have helped define the many facets of the Prada world.*" (The Prada Group Annual Report 2017, Pag. 35, 2018)^[10] Also Pirelli S.P.A., one of the largest tire manufacturer of the

world, opened a permanent site for contemporary art and design, named Hangar Bicocca and located in the Bicocca district of Milan. The building used to be a Pirelli factory and it was converted into 10,900 square metres of exhibition galleries in 2012. Throughout these years it has presented major solo shows and offered educational activities for kids, schools and universities. *“High art and sleek, brilliant design are ways of communicating Pirelli’s values and culture as an unconventional and innovative company.” - Marco Tronchetti Provera (Pirelli.com, 2015)^[11]*

2.4 Corporate sponsoring

A different investing option occurs with corporate sponsoring: a form of marketing in which a payment is made by a company for the right to be associated with a project or a program (Kenton, 2018)^[12]. A common template for corporate sponsorships entails a collaboration between a non-profit organization and a sponsor corporation (called *investing company*), but it’s not the same as philanthropy, which involves donations to causes that serve the public good but that may not yield any return. Compared to business expansions, corporate sponsorship is said to help firms to perform well in their core competencies, hinder risk and mitigate a shortage of highly specialized skills or expertise. Here the role of the culture consultant (also called *intermediary*) becomes consequently paramount: an external company not only in charge of co-creating the project and managing its cultural impact, but also called to deploy its know-how and leverage its network in this niche market so that a bridge between the investing company and the architecture and design market can be built (Justin O’Connor, 2000)^[13]. The intermediary is responsible for offering guidance and recommendations on behalf of the investing company and providing advocacy for the project. Moreover, it takes care of the selection process of suitable artists, designers and architectures and briefs them: great artists are in demand and a well-regarded advisor can facilitate access and encourage their

participation (British Property Federation and researched by the Contemporary Art Society, 2017) ^[14].

3. The budgeting process in project management

3.1 Introduction to the budgeting process

In the first phase of the *Project Framework* provided in section 2.3, a draft of the budget is already discussed and reported in the *Booklet*. Regardless the format of the project (business expansion or corporate sponsorship), no project plan is completed until a budget projection is estimated. It is a fundamental step during which the project itself gets better structured; only after the budget feasibility approval it can be said that the project will really take life. Therefore, the following sections will outline the budgeting process of design and architectural programs and the techniques used.

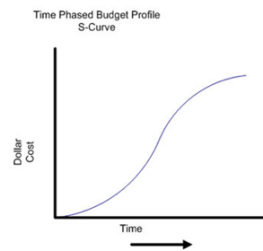
3.2. Budget definition and computation techniques

James P. Lewis mentioned that the basic characteristic of each project is a triple limit, expressed through the scope of the project, the time and the budget, so that each of these items affects significantly the quality (*James P. Lewis, 2010*) ^[15]. Figure II:



The budget is one of the most important internal administrative tool and corresponds to an estimate of costs, revenues, and resources over a specified period, reflecting a reading of future financial conditions and goals. Most project expenditures follow an S-Curve pattern over time: resources expand slowly, ramp up rather quickly as more are utilized and then taper off as the project comes to completion (*Shohreh Ghorbani, 2017*) ^[16]. Knowing the timing of expenditures

on a project will assist management in planning appropriately (Kerzner, H., 2002)^[17]. Figure III:



Therefore, a budget serves as a plan of action for achieving quantified objectives, for measuring performance and for coping with foreseeable adverse situations (BusinessDictionary.com, 2018)^[18]. It is consequently an integral part of running any business efficiently and effectively. The budgeting process begins by establishing assumptions for the upcoming period which are related to the projected sales and cost trends as well as to the overall economic outlook of the market, industry or sector (CIMA Official Terminology, 2008)^[19]. The budget is published in a packet that outlines the standards and explanations of how certain calculations were made. It should be constructed in a top-down format, so that a master budget contains a broad summary, while separate documents contain supporting budgets rolling up into the master one and provide additional details (Welsch, Hilton and Gordon, 2010)^[20].

3.3 Budgeting costs

According to the *Work Breakdown Structure* (WBS), the complicated tasks have to be subdivided into smaller ones, called “*until level*” so that becomes easier and more precise to estimate how long they will take and how much they will worth. Once the project has been broken down into unit levels and each cost has been estimated, project managers are able to calculate the overall project costs in a process called *cost aggregation* (Adrienne Watt, 2018)^[21]. In order to come up with a reliable cost estimation, different computation techniques can be used, bearing in mind the trade trade-off between accuracy and relevance: if the piece of information we are looking for is worth the time of the research, then it is better to spend

efforts investigating to elaborate a more accurate evaluation; on the other hand, if the researched data is not regarded as a determinant one for the sake of the budget comprehension, a more general evaluation can be provided. The most renown techniques for this purpose are *analogous estimating* and *bottom-up estimating* (Adrienne Watt, 2018)^[22]. *Analogous estimating* is based on similar projects amounts, adjusted according to the judgment of the person who makes the estimate. This judgment is considered more objective if the project consists of activities that are common to many others that were done before, since average costs are available per unit. In such cases, some of the factors which determine the activities' output turn into measurable parameters that can be used in an equation to predict the final cost result (*parametric estimates*) while other project-specific parameters are used as variables to refine the final estimate. This methodology, combined with the experience of the estimator, can produce meaningful results during the first stages of design and architectural projects when limited information is available. On the other hand, *Bottom-Up Estimating* is the most accurate but time-consuming method. It works by identifying the cost of every item in each activity of the schedule and by summing them up to finally reach higher levels.

Earned Value Management Analysis

Once the budget is structured and the project takes off, a periodical comparison of the budgeted costs with the actual ones is performed. The Earned value management (EVM) is a meaningful analysis to keep track of the project's progressions and its most used indicators are SPI and CPI. SPI (*Schedule performance index*) gives an indication of how much of the project is completed and consists in the ration between the amount of work that should have been done by a particular date (*planned value* - PV) and the work that has actually been done (*earned value* - EV), represented in cost terms. If SPI is greater than 1, more work has been completed than the planned one while if it's less than 1 you are behind schedule (Fahad Usmani, 2017)^[23].

$$SPI = \frac{EV}{PV}$$

CPI (*Cost Performance Index*) helps to analyse the efficiency of the costs utilized during the project, expressed as a ratio of *earned value* (EV) to *actual cost* (AC). This indicates how well the project is remaining on budget: if CPI is less than 1 the project is over budget, while if it's greater than 1 you are performing well against the budget (Fahad Usmani, 2017) ^[23].

$$CPI = \frac{EV}{AC}$$

4. The profitability analysis

After that the cost side of the budget is completed and an overview of the future cash outflows is estimated, an evaluation of the monetary benefits of the project proposal is normally computed to perform a profitability analysis that compares costs with revenues. The profitability analysis is a component of the *enterprise resource planning* (ERP) that supports the project sponsor decision whether to undertake the project or not (Davide Sartori, 2018)^[24].

The methodologies most widely used for the profitability analysis are:

- The *Net Present Value* (NPV) which considers the current value of future net cash flows discounted by a discount rate computed using the expected return of other investment choices with a similar level of risk ^[22] or the costs associated with borrowing money needed to finance the project (Berk, DeMarzo and Stangeland, 2015)^[25].
- The *Return on investment* (ROI), a ratio which directly measure the amount of return on a particular investment, relative to the investment's cost (Chen, 2018)^[26].

As far as design and architectural projects without commercial values are concerned, the outputs produced are not meant for sale and won't generate any stream of revenue. Therefore, the cost-effectiveness study based on the NPV or on the ROI can't be adopted neither to gauge the value generated or to support managers' investing choices. However, not having a commercial value doesn't imply that other forms of added value or indirect impacts can't be generated, rather than another approach has to be chosen for this specific evaluation.

5. Alternative costs-benefits analysis for design and architectural projects

To develop an alternative costs-benefits analysis, the financial studies need to be backed up by investigations in other areas, namely strategy, cause marketing and CSR. More specifically, CSR frameworks can be considered and adapted to further investigate the possible returns generated. To do so, a general overview of CSR is provided.

5.1 Definition of strategic CSR, its benefits and its future challenges

Corporate social responsibility is defined as a self-regulating business model that helps a company to be socially accountable - to itself, its stakeholder and to the public - in ways which go beyond what is strictly required by the law (James Chen, 2018)^[27]. It represents an investment that profit maximizing firms undertake in social capital jointly with the production of public goods. The main fundamental embedded in CSR is that no business corporate can act isolated from broader issues of society, ending up competing beyond technology, products and services' quality and price (Chahal and Sharma, 2006)^[28]. The realm of CSR is genetically very broad hence its "*antecedents*" should be understood before elaborating any CSR strategy, namely: the organization culture, its human resources, its products and services, the social development activities and the regulatory environment. Even though the effects of CSR on the economic results are complexed to trace, investments in this area have increased over the last decade and it's consequentially important to understand their rationale (Homroy, Banerjee and Slechten, 2015)^[29]. Only from an economic perspective, there are 2 main benefits that a company gets:

1. CSR is an advertising and product differentiation tool to gain a competitive advantage in hyper competitive markets where people derive utility from consuming products and services produced in socially responsible manner.
2. CSR is a way to increase employee and client retention by building trust, a more and more important factor as trust in businesses is declining (Stern, 2018)^[30].

As the slow economic recovery continues to dampen corporate profits, more CEOs are shifting their traditional and purely philanthropic charitable giving programs to more strategic ones: specific actions or investments aligned with the corporate culture and mission are undertaken so that benefits both to the society and the business are guaranteed. Design and architectural projects with no commercial values can fit in the category of CSR strategies.

5.2 Investing decision in strategic CSR

In the article entitled "*Why Sponsors Sponsor*," the author Jim Karrh lists the four criteria that are used by most companies in assessing whether to undertake an investment in CSR or not:



Figure IV

- 1) Relevance: the cause must be relevant to the company's products or service.
- 2) Branding Fit: there must be a good fit with the overall company brand.
- 3) Mission Alignment: the partnership must align with a company's mission.
- 4) Business Result: the company must believe it can achieve some measurable business result through the partnership.

To make sure that number 4) is achieved the LBG model and the SROI method come in handy, though they have to be adapted to design-led CSR strategies.

5.3 London Benchmarking Group model applied to design and architecture

As design-led CSR strategies are concerned, the rise of strategic CSR programs results in greater expectations on the *intermediaries* to prove the value of their work to the *investor* by identifying and measuring results. As a good starting option to measure inputs, outputs and outcomes the *London Benchmarking Group model* can be adopted to inform the management about the direction of the project (Lbg-online.net, 2018)^[31]. The Figure V reported below

represents graphically this framework, adjusted for design and architectural scopes by the author.

LONDON BENCHMARKING MODEL			
STAKEHOLDERS	INPUTS	OUTPUTS	IMPACTS
Who? Organisations involved Partners NGOs Society at large Targeted group of people	How? Cash Time In-kind Management costs	Cultural and social Art, design, architecture pieces Educational or social design projects Knowledge production units Book Exhibitions Workshops and seminars Documentaries Environmental Re-usage of waste materials Utilisation of sustainable materials Business Communication campaign Development of relationships with stakeholders Partnerships with public or private institutions Competitive advantage New market or new audience reach	Cultural and social Participations and connctions Social integration Quality of life/well being Skills acquisition/personal effectiveness Education Cohesiveness Knowledge production Environmental Ecological awareness Enhancement of sustainability values Business Sales increase over time Uplift in brand awareness Goodwill generation Market penetration Increased knowledge of the market and its actors Development of relationships and connctions Media exposure Higer purchase intentions

“Stakeholders” are people or organisations involved in the project in some way and that, more specifically, experience change as a result of the activity. “Inputs” are the resources that the *investing company* provides to support the design and architectural project or programme, while “Outputs” is what happens because of the resources committed. Finally, “Impacts” are the changes that occur to namely to individuals, the environment and the company, in the short or longer-term, as a consequence of these activities. Once the major impacts generated are understood, a way to quantify them should be designed, so that managers would know which impact their contribution yields as well as make more informed investment decisions. At this purpose, the SROI methodology can be used.

5.4 The SROI methodology to measure impact

Although the SROI index (Social Return on Investment) has been deployed to measure the extra-financial value for various social investments, it still remains unexplored in the areas of design and architecture, mainly because of its subjectivity (Krlev, Münscher and Mülberty,

2018)^[32] and the problems with most of the arts-related data collection systems which tend to not be “anchored in any theories about the societal impacts of the arts” (Maria Rosario Jackson). The SROI was first put forth by ‘Roberts Enterprise Development Fund’ in the USA and has then been developed further by the ‘new economics foundation’ in the UK. It is a methodology that puts financial 'proxies', expressed by a price, to those impacts which do not typically have market value. This process is called “monetization” and to be completed the *intermediary* has to:

1) Ensure to have an efficient data collection system in place to be able to estimate price values and correctly compute the SROI. The data collected may be available from existing sources (internal or external) or from a new collection systems set up for the project. Examples of methods to use during this evaluation are the willingness-to-pay, the value game or satisfaction surveys. Although monetization has a considerable number of shortcomings it represents a possible pathway in the current landscape of cultural impact measurement (Socialvalueuk.org, 2015)^[33].

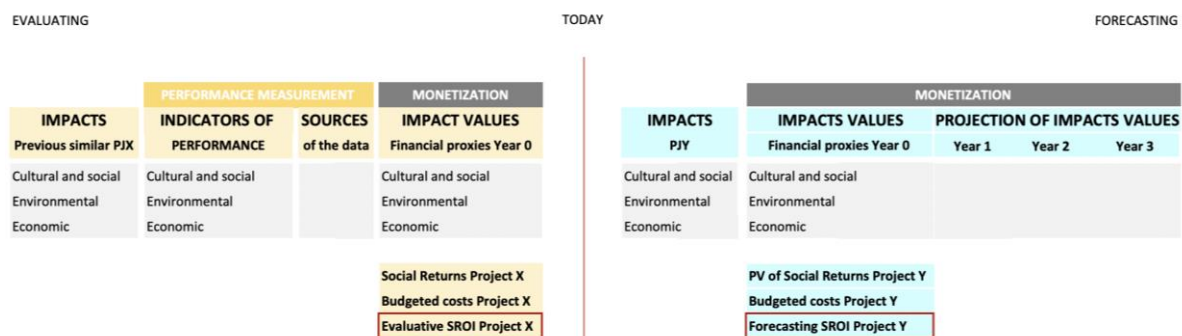
2) Considering soft outcomes which are harder to capture in the monetization process, it is important to acknowledge the risk of subjectivity involved and transparently describe the computation methods for the monetization so that SROI’s overestimations are avoided. Only in this way the *intermediary* can provide important insights preserving its accountability.

Once the monetization process has been completed, the SROI is obtained by comparing social returns (sum of cultural, social, environmental and economic impacts values) with the costs needed to finance the project:

$$SROI = \frac{\text{Social benefits}}{\text{Budgeted costs}}$$

It is worth to highlight that the goal of the SROI analysis is never to just come up with a number, but provide a holistic framework used as a narrative to ensure consistency between resources

and objectives throughout the project so that stakeholders can get more involved (Salverda, M, 2016)^[34]. Two different typologies of SROI analyses are identifiable: an “evaluative” one which is conducted retrospectively and a “forecasting” one which predicts the future value creation. As the latter one is examined, its approach is structured similarly to the NPV one (left side of Figure VI) but it is broadened by taking into account social, cultural, environmental and economic impacts which are traditionally overlooked.



During the internship the author had the chance to observe that the SROI forecasting method is still far away from being applied because of the complexity to monetize the future impacts generated, while a backward one, illustrated in the next paragraph, is preferred.

Backward SROI approach on similar projects

A backward SROI approach functions as a performance measurement model that evaluates the impacts of a project *a posteriori* thanks to a series of KPIs developed through internal or external data collecting systems (Left side of Figure V). As an investment decision tool, it analyses the performance of one or more previous similar projects, taken as a baseline and used to understand what kind of value can be equivalently generated. The more the *intermediary* scores high KPIs in the projects it delivers, the more its reputation increases, its expertise in the field grows and its cultural intervention’s areas broadens. These results scored, ultimately summed up in the *Evaluating SROI*, will suffer less from the monetization process’s subjectivity because the financial proxies refer to something that has happened in the past and whose impact is more tangible and measurable through the KPIs. Thanks to the *Evaluating*

SROI the *intermediary's* trust and accountability is built. In conclusion, even though the forecasting *SROI* is theoretically a more precise and complete method because specific to the project that the *investing company* intends to finance, the backward approach is normally the preferred one in practice because it allows to come up with a valuable estimation of the performance of a previous similar project, used as benchmark and as a source of information about the quality of work provided by the intermediary.

6. Practical application

A presentation of experimenta, Amorim and Amorim 2020 is given to exemplify how design and architecture projects can be aligned to the company goals and generate cultural impacts at the same time. An overview of how the *SROI* evaluative and forecasting frameworks are applied in the investing decision will be also shown. Finally, from Appendix 12 to 16, the Amorim's budget documentation, the timeline and the earned value analysis can be found. Disguised numbers were used.

6.1 The intermediary - Experimenta

Experimentadesign is a non-profit cultural organisation created in 1998 in Lisbon, committed to promoting culture, design and architecture in Portugal and abroad. It involves and energizes a wide range of interlocutors such as creators, theorists, academics, businessmen, politicians, government officials, students and the general public. The final outputs that experimenta delivers take place in various formats which range within exhibitions, workshops, seminars, conferences, books, documentaries and websites. During the years of Lisbon Biennale (1999 - 2017) its main sources of revenue were public and private grants (as those from Governo do Portugal, Turismo de Lisboa, Câmara Municipal de Lisboa, Heineken, Luso, Caixa Geral de Depósitos, Nissan, etc)^[35]. At the beginning of 2018 the association went through a reassessment of its business model, switching to a project-base structure. Therefore, the

business & consulting area became the most relevant source of income to guarantee its sustainability: by offering strategic design, consulting, curation, communication and project management services experimenta has elaborated an innovative way to conjugate culture and business. Assuming design, culture and creativity as differentiating factors, capital gains and resources, it develops integrated responses for clients in the private economic fabric and in the institutional environment. In conclusion, experimenta is an ideal working partner for those companies looking for innovative and cross-cutting solutions to the challenging context of the 21st century, with a view to increasing competitiveness, revitalizing, conquering new markets, internationalization and differentiation.

6.2 The investing company - Amorim

The Amorim Group is one of the largest, most entrepreneurial and dynamic Portuguese multinationals and family business specialized in the production and distribution of cork. Its origins dates back to 1870 and since then, it has been operating with the same entrepreneurial vision, responsibility, diligence and innovation through several generations. Today it has become the world leader in the industry hitting a market share of 62,7% and representing around 3% of the national Portuguese exports (Information Bureau, 2016)^[36]. With the mission to respect the principles of economic, social and environmental development, the Amorim Group incorporates industries as diverse as aeronautics, automotive, telecommunication, construction and winegrowing. Observing the maxim *«not just one market, not just one client, not just one currency, not just one product»*, the group started to overcome geographical borders and constraints and presented cork to the world.

6.3 The project - Amorim 2020

In 2008 Amorim commissioned two design and architectural projects to experimenta, namely *Materia* and *Metamorphosis*^[37]. *Materia* aimed to present new perspectives around corks in the European market and to challenge the prejudices around its usages for aesthetic purposes:

"Cork is a material which is certainly worthy of attention in design. Its appeal lies in the combination of its old-world appeal and new-world technical capabilities." - Jasper Morrison (*Product designer*)^[38]. Materia presented cork as the leading material for the 21st century, not only for high-performance applications as aeronautic, construction or wine-producing, but also for the everyday life of any urban dweller. The collection of objects produced was meant to be for sale. Metamorphosis was an experimental project which gave total creative freedom to the designers and architects so that new cork applications and functions could be discovered and used as a source of inspiration. The outcomes didn't have commercial value. To give continuity to these two previous programs, Amorim now wants to strategically communicate in the north-American market to further expand in such geographic area and acquire a competitive advantage to defeat competition. Indeed, Amorim exports cork in more than 100 countries, but one of the largest share of production goes to the U.S., a geographic area that grew in sales by 2.7% in 2017, following its eighth year of expansion and strengthening its position as the Group's most important sales destination (21% Amorim total sales) (Amorim Annual Report 2017)^[39]. This improvement was not wholly a result of the exchange rate effect: volume growth, the sales mix and continuous effort to take the best advantages of such strong market have also contributed growing the importance of the US. Therefore, the project *Amorim 2020* aims to increase the knowledge around cork and its usages in this territory and, more specifically, about Amorim by producing urban architectural pieces with no commercial value. The strategy proposed by experimenta consists in two axes; the first one, directed to the past, identifies the US historical interest around cork in the period between 1920 and 1980, when in Portugal it was a material bashfully hidden in the constructions or deployed only for social projects because regarded as a low-class material. During those same years, a generation of elite American architects, such as Frank Lloyd Wright, Marcel Breuer and Richard Neutra, already considered cork as a material of excellence. For this axis, a research unit will be created

to produce systematic knowledge, composed by a partnership between Portuguese and American universities, coordinated by *experimenta*. The information collected through this process will give birth to a book and will feed the different media used in the communication campaign. The second axis of the project is about the future role of cork and it challenges creative minds to elaborate site-specific proposals for urban contexts. The briefing will address essential themes such as urban mobility, urban flexibility and sustainability. *Experimenta* will be responsible to appoint architects who can add value to this material and to Amorim in the American market and back them with an effective communication plan. The Amorim Group will have the chance to directly dialogue with some key American cities, to consolidate its innovative image and build new dynamic relationships with this foreign country. New York has been chosen as the city to develop this axis, because of its importance as crucial creative point and because of its legacy with architecture and design, elements that would eventually provide unique resonance to the project.

6.4 Alternative evaluation of the project Amorim 2020

After that the budget documentation for the 2 years was completed by *experimenta* and costs were estimated, the author proceeded developing an exemplification of how the SROI *evaluative* and *forecasting* methodologies could be applied to the Amorim 2020 project (graphically reported below, Figure VII).



Evaluative SROI of First stone

In the evaluative case (left side), the impacts of other 3 projects that experimenta was appointed to curate have been taken into consideration. Two are the Amorim previous projects *Materia* and *Metamorphosis* (explained in paragraph 6.4) while the third one is *First Stone*, selected because of the similarities with Amorim 2020: indeed, it's a research programme that explores the potentials of Portuguese stone by developing design and architecture applications. Over 2016 and 2017 it accomplished exhibitions in Venice, Milan, Weil am Rhein, São Paulo, London and New York which aimed to highlight the stone's qualities as well as the vast industry that is connected to its extraction and transformation. The outputs produced were 27 pieces, a conference, a website, a book, a documentary and 2 mobile Apps. In the Figure VIII below a more thorough description of the SROI *evaluative* method is reported for First Stone.

IMPACTS First Stone	PERFORMANCE MEASUREMENT		MONETIZATION Of impacts
	INDICATORS OF PERFORMANCE	SOURCES Of indicators of performance	
CULTURAL Participations and connections Systematic knowledge around stone New usages of stones in architecture	CULTURAL Event check-ins and attendee satisfaction Stone adoption in design and architecture projects Availability of information about stone Consistency of information about stone Awareness of the portuguese stone industry and its players Awareness of the importance of portuguese stone for the country and its culture	CULTURAL NPS and other surveys Number of cultural pieces produced with portuguese stone Stone usages reports (quantity and purposes) Interviews with designer and architects about stone Interviews with stone companies about the changes they experienced Media attention towards stone	CULTURAL € € € € € €
ENVIRONMENTAL Ecological awareness thanks to stone waste reusages Enhancement of sustainability values	ENVIRONMENTAL Public awareness Renewable resources adoption Waste generation and waste recycling	ENVIRONMENTAL Surveys, number of environmental educational programs Adoption rate Recycling rate	ENVIRONMENTAL € € €
ECONOMIC Sales increase Increase in value per m3 of marble Uplift in brand awareness Goodwill generation Development of strategic partnerships between stone companies, local authorities, foreign authorities and other relevant organisations	ECONOMIC Sales figures over time Brand and sponsorship recall Higher purchase intention Media exposure Number of projects or cooperational works done between stone companies, local authorities, foreign authorities and other relevant organisations	ECONOMIC Income statement Media mentions, social media engagement Interviews with stakeholders Governmental reports Market researches Industry reports	ECONOMIC € € € € € €
Social Returns First Stone Budgeted costs First Stone Evaluating SROI First Stone			

Forecasting SROI of Amorim 2020

As the *Forecasting* method is examined, the SROI analysis will be configured as the following in Figure IX.

IMPACTS Amorim	MONETIZATION OF IMPACT VALUES Financial proxies		
	2019	2020	2021
CULTURAL AND SOCIAL			
Participations and connections	€	€	€
Systematic knowledge around Cork	€	€	€
New usages of cork in urban architecture	€	€	€
Cork adoption in other areas	€	€	€
Awareness of portuguese stone culture and its importance for the country	€	€	€
Local community development	€	€	€
Improved perception of the local area	€	€	€
Connections between the portuguese and the american culture	€	€	€
ENVIRONMENTAL			
Ecological awareness around cork	€	€	€
Enhancement of sustainability values	€	€	€
ECONOMIC			
Sales increase over time	€	€	€
Brand and sponsoring recall in the US	€	€	€
Higher purchase intention	€	€	€
Media exposure	€	€	€
Goodwill generation	€	€	€
Market penetration in the US	€	€	€
Connections with university students	€	€	€
Relationships with local authorities	€	€	€
Relationships with influential NY architects	€	€	€
PV of Social Returns Amorim			
Budgeted costs Amorim			
Forecasting SROI Amorim			

7. Final discussion and conclusion

Overall the LBG model and its stakeholder-view have been positively embraced for art, design and architectural projects, while little application of the SROI methodology has occurred. Without being adopted by *experimenta*, the SROI framework was proposed by the author as a useful way to grasp the economic value generated for Amorim as well as the cultural, social and environmental one. The next steps and challenges that cultural consultant will have to face are listed as follows:

- 1) **Mentality change:** The sceptical mentality towards cultural impact measurement has to be left aside so that data collection systems can be set up more widely. There are several recent and ongoing research initiatives working to better assess artists' contributions to society on a number of fronts – education, economic development, social capital, and civic engagement among others (Jackson et al., 2018)^[40]. The SROI approach, seen above, recognizes that the cultural agents don't operate in a vacuum.
- 2) **Good outcomes data, record keeping and indicators:** To enable the SROI analysis to be carried out, good outcomes data are both necessary and initially challenging to capture. Involving stakeholders helps cultural consultants to know the strength and weaknesses of their activities so that more remarkable outcome indicators are built. In the Amorim 2020 case, the main stakeholder would be The Amorim Group, but other relevant are the 5 participating architects, the local authorities in New York and its city dwellers and the involved university (Appendix 20). Ideal would be to mix indicators that are subjective (or self-reported) and objective to complement each other. Good record keeping is also essential since the SROI report needs to document the decisions and assumptions made along the calculations. If good record keeping is incorporated into the everyday activities and the right information is in place, it is easier and more cost-effective to conduct a forecasting SROI analysis first and an evaluative one afterwards.

- 3) Monetisation: while monetization may seem initially daunting, practice and widespread standards will improve and order the financial proxies to adopt.
- 4) Overall analysis: investors like Amorim should be educated on the importance of putting the ratio in the context of the overall analysis to make decisions. The SROI report has to be consistent and calculations robust and accurate to create accountability.

The proposed template might represent a significant step in the sector's evolution, making possible to move towards comparable impact assessments and take better informed investments decisions. It can also be relevant for cultural consultants as *experimenta* to become better internally managed, to engage stakeholders and ultimately to maximise the cultural value produced.

8. REFERENCES

- [1] Domusweb.it. (2017). Experimenta Design cambia formula: non più mostre, ma conferenze. Report da Lisbona. [online] Available at: <https://www.domusweb.it/it/design/2017/10/12/experimenta-design-cambia-formula-non-pi-mostre-ma-conferenze-report-da-lisbona.html>
- [2] BusinessDictionary.com. (2018). What is product value? definition and meaning. [online] Available at: <http://www.businessdictionary.com/definition/product-value.html>
- [3] Samim, A. and Fardi, N. (2016). Difference Between Art And Design - Daevas Design. [online] Daevas Design. Available at: <http://www.daevasdesign.com/difference-art-and-design/>
- [4] [5] Snowball, J. (2018). Why art and culture contribute more to an economy than growth and jobs. [online] The Conversation. Available at: <http://theconversation.com/why-art-and-culture-contribute-more-to-an-economy-than-growth-and-jobs-52224>
- [6] Points, B. (2017). How Do the Arts Affect Economic Growth?. [online] Creative Vitality Suite. Available at: <https://cvsuite.org/2017/03/28/arts-affect-economic-growth/>
- [6] Florida, R. (2015). The Precise Way the Arts Add to City Economies. [online] CityLab. Available at: <https://www.citylab.com/life/2015/12/how-the-arts-add-to-city-economies/421191/>

[7] [14] British Property Federation and researched by the Contemporary Art Society (2017).

A Guide to commissioning Public Art. [online] Bpf.org.uk. Available at:

<https://www.bpf.org.uk/sites/default/files/resources/Guide-to-commissioning-public-art-web.pdf>

[8] O'Donnell, O. and Boyle, R. (2008). Understanding and Managing Organisational

Culture. [online] Ipa.ie. Available at:

https://www.ipa.ie/_fileUpload/Documents/CPMR_DP_40_Understanding_Managing_Org_Culture.pdf

[9] Foundation Luis Vuitton Press Kit (2014). Foundation Luis Vuitton Press Kit Opening

October 27th, 2014. [online] R.lvmh-static.com. Available at: [https://r.lvmh-](https://r.lvmh-static.com/uploads/2015/01/oct-2014flv-press-kit.pdf)

[static.com/uploads/2015/01/oct-2014flv-press-kit.pdf](https://r.lvmh-static.com/uploads/2015/01/oct-2014flv-press-kit.pdf)

[10] The Prada Group Annual Report 2017 (2018). The Prada Group Annual Report 2017.

[online] Pradagroup.com. Available at: <https://www.pradagroup.com/etc/designs/pradagroup-balance/docs/prada-annual-report-2017.pdf>

[11] Pirelli.com. (2015). *Art and Pirelli: from Armando Testa to the Street Art*. [online]

Available at: <https://www.pirelli.com/global/en-ww/life/art-and-pirelli-from-armando-testa-to-the-street-art>

[12] Kenton, W. (2018). Corporate Sponsorship. [online] Investopedia. Available at:

<https://www.investopedia.com/terms/c/corporate-sponsorship.asp>

- [13] Justin O'Connor (2000). The Definition of the 'Cultural Industries'. [online] eprints.qut.edu.au. Available at: <http://eprints.qut.edu.au/43877/2/43877.pdf>
- [15] James P. Lewis (2010). Project Planning, Scheduling & Control. 5th ed. McGraw Hill.
- [16] Shohreh Ghorbani (2017). The Philosophy Behind S-curves. [online] Project Control Academy. Available at: <https://www.projectcontrolacademy.com/s-curve/>
- [17] Kerzner, H. (2002). Strategic Planning for Project Management Using a Project Management Maturity Model. pp.17, 60.
- [18] BusinessDictionary.com. (2018). Budget definition. [online] Available at: <http://www.businessdictionary.com/definition/budget.html>
- [19] CIMA Official Terminology (2008). Budgeting. [online] Web.archive.org. Available at: https://web.archive.org/web/20130810055251/http://www.cimaglobal.com/Documents/ImportedDocuments/cig_tg_budgeting_mar08.pdf
- [20] Welsch, G., Hilton, R. and Gordon, P. (2010). Budgeting. 5th ed. Thailand: Pearson education Indochina, p.443.
- [21] [22] Adrienne Watt (2018). Budget Planning – Project Management. [online] Opentextbc.ca. Available at: <https://opentextbc.ca/projectmanagement/chapter/chapter-12-budget-planning-project-management/>

[23] Fahad Usmani (2017). Schedule Performance Index (SPI) & Cost Performance Index (CPI). [online] Pmstudycircle.com. Available at:
<https://pmstudycircle.com/2012/05/schedule-performance-index-spi-and-cost-performance-index-cpi/>

[24] Davide Sartori (2018). Guide to Cost-Benefit Analysis of Investment Projects. [online] Ec.europa.eu. Available at:
https://ec.europa.eu/regional_policy/sources/docgener/studies/pdf/cba_guide.pdf

[25] Berk, J., DeMarzo, P. and Stangeland, D. (2015). Corporate finance. 3rd ed. Harlow: Pearson, p.64.

[26] Chen, J. (2018). Return on Investment (ROI). [online] Investopedia. Available at:
<https://www.investopedia.com/terms/r/returnoninvestment.asp>

[27] James Chen (2018). Corporate Social Responsibility (CSR). [online] Investopedia. Available at: <https://www.investopedia.com/terms/c/corp-social-responsibility.asp>

[28] Chahal, H. and Sharma, R. (2006). Journal of Services Research, Volume 6, Number 1. Institute for International Management and Technology.

[29] Homroy, S., Banerjee, S. and Slechten, A. (2015). Why do some some firms invest more in CSR? The effect of Corporate Holding Stucture on CSR. Lancaster University.

[30] Stern, L. (2018). Corporate Social Responsibility & the Arts. [online]

Animatingdemocracy.org. Available at:

http://animatingdemocracy.org/sites/default/files/CSR_Report_FINAL.pdf

[31] Lbg-online.net. (2018). LBG Guidance Manual. [online] Available at: [http://www.lbg-](http://www.lbg-online.net/wp-content/uploads/2018/10/LBG-Public-Guidance-Manual_2018.pdf)

[online.net/wp-content/uploads/2018/10/LBG-Public-Guidance-Manual_2018.pdf](http://www.lbg-online.net/wp-content/uploads/2018/10/LBG-Public-Guidance-Manual_2018.pdf)

[32] Krlev, G., Münscher, R. and Mülbert, K. (2018). Social Return on Investment (SROI):

State-of-the-Art and Perspectives A Meta-Analysis of practice in Social Return on

Investment (SROI) studies published 2002-2012. [online] Archiv.ub.uni-heidelberg.de.

Available at: [http://archiv.ub.uni-](http://archiv.ub.uni-heidelberg.de/volltextserver/18758/1/CSI_SROI_Meta_Analysis_2013.pdf)

[heidelberg.de/volltextserver/18758/1/CSI_SROI_Meta_Analysis_2013.pdf](http://archiv.ub.uni-heidelberg.de/volltextserver/18758/1/CSI_SROI_Meta_Analysis_2013.pdf)

[33] Socialvalueuk.org. (2015). Social Return on Investment and commissioning. [online]

Available at: [http://www.socialvalueuk.org/app/uploads/2016/03/SROI-](http://www.socialvalueuk.org/app/uploads/2016/03/SROI-Supplement_Commission_for_web.pdf)

[Supplement_Commission_for_web.pdf](http://www.socialvalueuk.org/app/uploads/2016/03/SROI-Supplement_Commission_for_web.pdf)

And

Socialvalueuk.org. (2012). A guide to Social Return on Investment. [online] Available at:

[http://www.socialvalueuk.org/app/uploads/2016/03/The%20Guide%20to%20Social%20Retu](http://www.socialvalueuk.org/app/uploads/2016/03/The%20Guide%20to%20Social%20Return%20on%20Investment%202015.pdf)
[rn%20on%20Investment%202015.pdf](http://www.socialvalueuk.org/app/uploads/2016/03/The%20Guide%20to%20Social%20Return%20on%20Investment%202015.pdf)

[34] Salverda, M. (2016) *Social Return on Investment*. BetterEvaluation. Retrieved from

<http://betterevaluation.org/approach/SROI>

[35] Lisbon Biennale, edition 2013: <http://www.experimentadesign.pt/2013/pt/05-04-00.html>

[36] Information Bureau - Cork sector in numbers (2016). Apcork Portuguese Cork Association[online] Available at:
<http://www.socialvalueuk.org/app/uploads/2016/03/The%20Guide%20to%20Social%20Return%20on%20Investment%202015.pdf>

[37] Materia project, available at:
<http://www.materia.amorim.com/en/materia/experimentadesign>

And

Metamorphosis project, available at:
<https://www.amorim.com/lideranca-global/projectos-de-referencia/METAMORPHOSIS-10-conceituados-criadores-10-projectos-de-investigacao/1293/>

[38] Portugal, F. (2008). *Metamorphosis*. [online] Amorim Cork Composites. Available at:
<https://amorimcorkcomposites.com/en/innovation/case-studies/metamorphosis/>

[39] Amorim Annual Report 2017, available at:
https://www.amorim.com/xms/files/Investidores/5_Relatorio_e_Contas/Consolidated_Annual_Report_2017.pdf

[40] Jackson, M., Kabwasa-Green, F., Swenson, D., Herranz, J., Ferryman, K., Atlas, C., Wallner, E. and Rosenstein, C. (2018). Investing in Creativity: A Study of the Support Structure for U.S. Artists. [online] Urban.org. Available at:
<https://www.urban.org/sites/default/files/publication/50806/411311-Investing-in-Creativity.PDF>

FIGURES LEGEND

- I)** British Property Federation and researched by the Contemporary Art Society (2017). A Guide to commissioning Public Art. [online] Bpf.org.uk. Available at:
<https://www.bpf.org.uk/sites/default/files/resources/Guide-to-commissioning-public-art-web.pdf>
- II)** Triple Limit - James P. Lewis (2010). Project Planning, Scheduling & Control. 5th ed. McGraw Hil.
- III)** S-Cure costs developed by .Kerzner, H. (2002). Strategic Planning for Project Management Using a Project Management Maturity Model. pp.17, 60.
- IV)** Four criteria used for assessing "*Why Sponsors Sponsor*" (Jim Karrh). Developed by the author.
- V)** LBG framework for design and architectural projects. Developed by the author.
- VI)** SROI evaluating and forecasting analyses. Developed by the author.
- VII)** SROI *evaluative* and *forecasting* analyses for Amorim. Developed by the author.
- VIII)** SROI *evaluative* analysis for First Stone. Developed by the author.
- IX)** Forecasting SROI analysis Amorim. Developed by the author.

APPENDIX

1) "Fondation Louis Vuitton" © Iwan Baan.

<https://www.inexhibit.com/mymuseum/fondation-louis-vuitton-paris-architect-frank-gehry/>



2) "Fondazione Prada Torre / OMA" 19 Apr 2018. ArchDaily.




<https://www.archdaily.com/892898/fondazione-prada-torre-oma/>



3) “Hangar Bicocca” © Pirelli HangarBicocca 2018. <https://www.hangarbicocca.org/en/kids/>



4) “LBG Guidance Manual”. http://www.lbg-online.net/wp-content/uploads/2018/10/LBG-Public-Guidance-Manual_2018.pdf

 Inputs: What's contributed?	 Outputs: What happens?	 Impacts: What changes?
How (form of contribution) Cash Time In-kind (including pro bono) Management costs Why (driver for contribution) Charitable gifts Community investment Commercial initiatives in the community What (issue addressed) Education Health Economic development Environment Arts and Culture Social welfare Emergency Relief Where (Location of activity) Europe Middle East & Africa Asia Pacific North America South America	Community outputs Individuals reached/supported Type of beneficiary Organizations supported Other company-specific output measure (e.g. environment) Business outputs Employees involved in the activity Media coverage achieved Customers/consumers reached Suppliers/distributors reached Other influential stakeholders reached Leverage (additional resources from other sources) Total leverage split by: Payroll giving Other employee contributions Customers Other organizations / sources Employees involved in own time Hours contributed in own time Foregone income	Community impacts On people i: Depth of impact Made a connection Made an improvement Made a transformation On people ii: Type of impact Behavior or attitude change Skills or personal effectiveness Quality of life/well-being On organizations Improved or new services Reached more people or spent more time with clients Improved management processes Increased their profile Taken on more staff or volunteers On the environment Impact on the environment Impact on environmental behavior Business impacts On employee volunteers Job-related skills Personal well-being Behavior change On the business Human resource benefits Stakeholder relations/perceptions Business generated Operational improvement delivered Uplift in brand awareness

6) “Information Bureau 2016 - Cork sector in numbers”. Apcor. http://www.apcor.pt/wp-content/uploads/2016/09/CORK-SECTOR-IN-NUMBERS_EN.pdf

Table 4 – World cork exports - 2015

Exporter countries	Million €	Market share (%)
Mundo	1.430,8	100,0%
Portugal*	897,2	62,7%
Spain	229,3	16,0%
France	67,0	4,7%
Italy	48,4	3,4%
Germany	28,8	2,0%
EUA	27,8	1,9%
China	20,2	1,4%
Morocco	19,2	1,3%
Chile	8,4	0,6%
Austria	7,2	0,5%
Others	77,2	5,4%

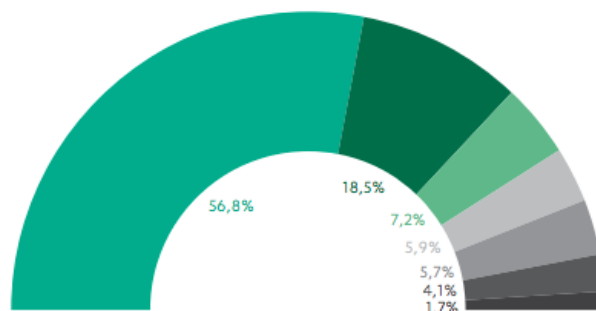
Table 3 – Cork Production

Country	Average anual production (ton) *	Percentage
Portugal	100,000	49.6%
Spain	61,504	30.5%
Morocco	11,686	5.8%
Argelia	9,915	4.9%
Tunisia	6,962	3.5%
Italy	6,161	3.1%
France	5,200	2.6%
Total	201,428	100.0%

Source: Portugal: FAO, 2010; Spain: FAO, 2010; Italy: FAO, 2010; France: FAO, 2010; Morocco: FAO, 2010; Algeria: FAO, 2010; Tunisia: FAO, 2010

7) Amorim sales by geographic area (Annual report 2015, 2016 and 2017)

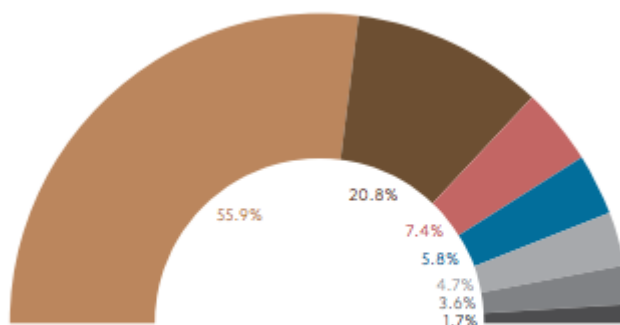
Consolidated Sales by Geographic Area



■ EU*
 ■ USA
 ■ Rest of America
 ■ Australasia
 ■ Portugal
 ■ Rest of Europe
 ■ Africa

* It includes Switzerland and Norway and excludes Portugal.
Sales to non-Group Clients.

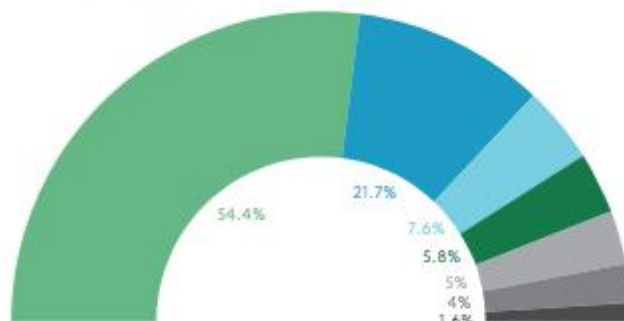
Consolidated Sales by Geographical Area



■ EU*
 ■ USA
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 ■ Portugal
 ■ Rest of Europe
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* It includes Switzerland and Norway and excludes Portugal.
Sales to non-Group Clients.

Sales by Geographical Area



■ EU*
 ■ USA
 ■ Rest of America
 ■ Australasia
 ■ Portugal
 ■ Rest of Europe
 ■ Africa

* It includes Switzerland and Norway and excludes Portugal.
Sales to non-Group Clients.

7) “Bowl Counterpiece” by Fernando Brizio. Materia project:

<http://www.materia.amorim.com/en/collection/complete-collection/furo>



8) “Senta” by Fernando Brizio. Materia project:

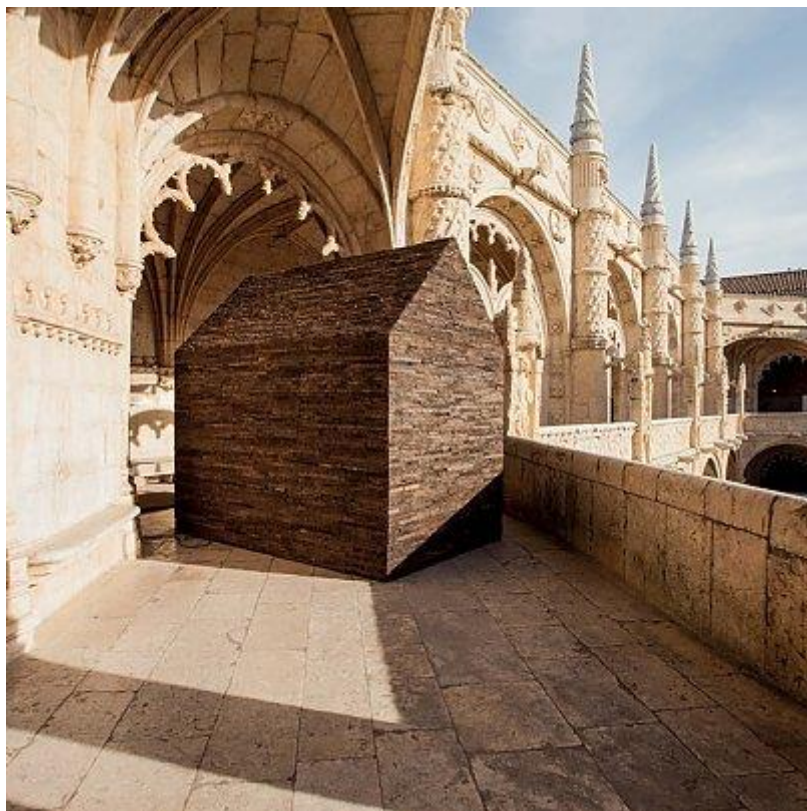
<http://www.materia.amorim.com/en/collection/complete-collection/senta>



9) “Cork Kit” by Amanda Levete. Metamorphosis project. © Pedro Sadio & Maria Rita



10) Metamorphosis project:



Gonçalves. <http://www.primeirapedra.com/en/projects/conversadeira/>





12) Amorim 2020 - Master Budget (altered numbers):

MASTER BUDGET AMORIM 2020

Duration 24 Months

Center of cost	Axes	Activity	Estimate costs	Actual costs	Paid	To be paid	Location	Starting	Ending
AMR/18	Transversal	Transversal Human Resources	€ 5,000.00	€ 1,112.30	€ 1,112.30	€ 0.00	Global	May 2018	May 2020
AMR/18		Communication and awareness campaign	€ 6,250.00	€ 463.89	€ 139.17	€ 324.72	Global	September 2018	September 2018
AMR/18	Axis 1	Research unit over cork in the USA and in Portugal between 1920 and 1980	€ 2,500.00	€ 67.98	€ 27.19	€ 40.79	Global	May 2018	May 2020
AMRNY/20	Axis 2	5 Installations in New York	€ 11,250.00	€ 2,745.60	€ 1,098.24	€ 1,647.36	Global	May 2020	May 2023
TOTAL			€ 25,000.00	€ 4,389.77	€ 2,376.90	€ 2,012.87			

13) Amorim 2020 - 8 months Budget:

FIRST 8 months BUDGET AMORIM 2020

Duration From May 2018 to December 2018

Center of cost	Axes	Activity	Estimate costs	Expected work to be done	Actual costs	Paid	To be paid	Location	Starting	Ending
AMR/18	Transversal	Transversal Human Resources	€ 1,666.67	33.33%	€ 1,112.30	€ 1,112.30	€ 0.00	Global	May 2018	May 2020
AMR/18		Communication and awareness campaign	€ 762.20	12.20%	€ 463.89	€ 139.17	€ 324.72	Global	September 2018	September 2018
AMR/18	Axis 1	Research unit over cork in the USA and in Portugal between 1920 and 1980	€ 441.18	17.65%	€ 67.98	€ 27.19	€ 40.79	Global	May 2018	May 2020
AMRNY/20	Axis 2	5 Installations in New York	€ 1,860.90	16.54%	€ 2,745.60	€ 1,098.24	€ 1,647.36	Global	May 2020	May 2023
TOTAL			€ 4,730.94	16.85%	€ 4,389.77	€ 2,376.90	€ 2,012.87			

14) Amorim 2020 - Activity Budget of the first 8 months:

[Go to the First 8 months period budget](#)

5 Installations in New York

Local: New York
Dates: May 2020
Centro de Custo: AMRNY/20

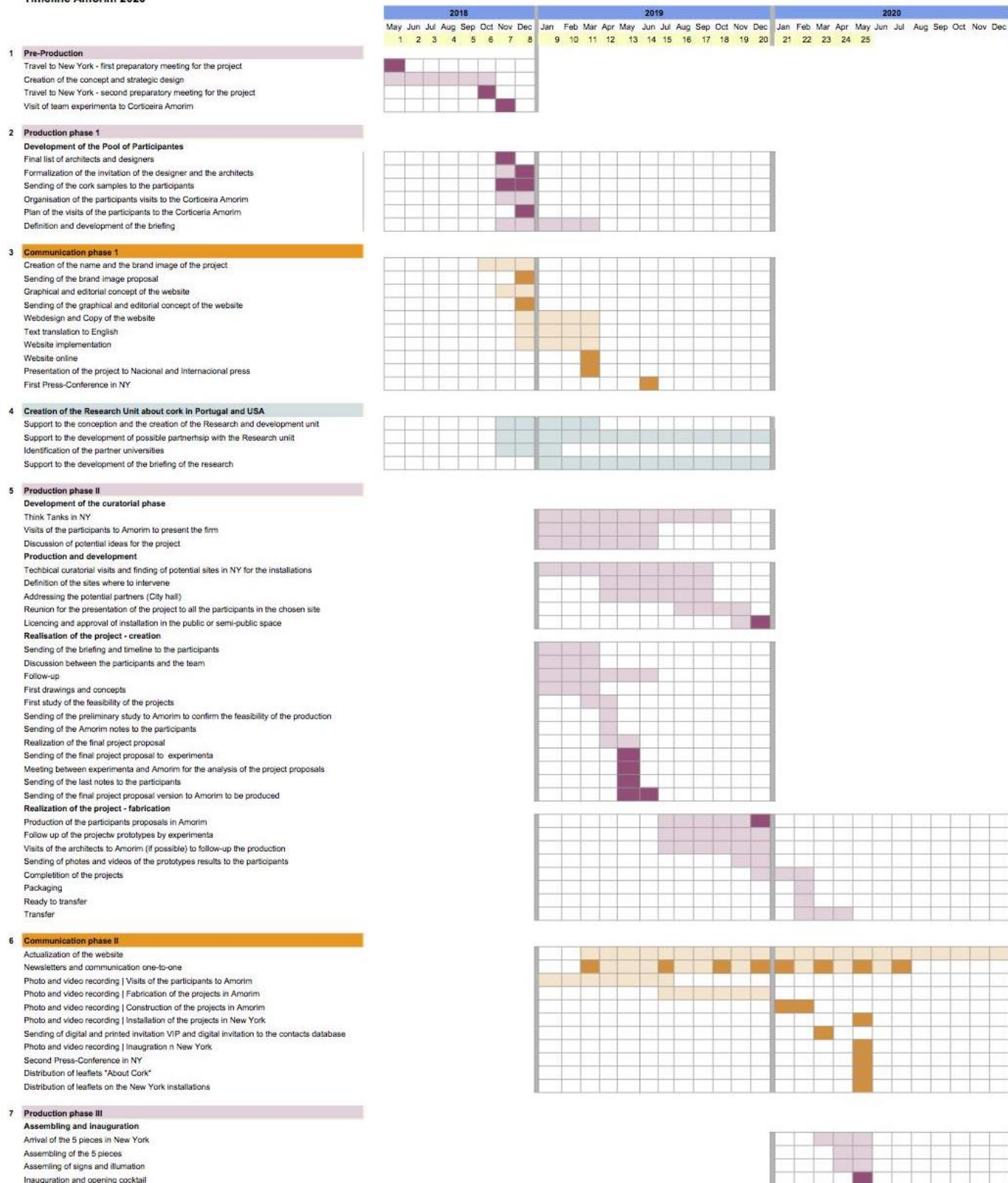
ORÇAMENTO ESTIMATIVO - OUT 18
Valor Total c/IVA*
€1,860.90

	Unitary Price without taxes	Quantity	People	Numero de factor	Valor Total s/IVA	Iva	Valor Total c/IVA	Notas
1 Recursos humanos not transversal					€ 440.00	€ 101.20	€ 541.20	
Exposition design	€ 10.00	1	1	1	€ 10.00	€ 2.30	€ 12.30	
Assembling local team	€ 8.00	7	5	1	€ 280.00	€ 64.40	€344.40	
Disassembling local team	€ 6.00	5	5	1	€ 150.00	€ 34.50	€184.50	
2 Fees participantes					€ 275.00	€ 63.25	€ 338.25	
Fees					€ 225.00	€ 51.75	€ 276.75	
5 Architects	€ 45.00	1	5	1	€ 225.00	€ 51.75	€ 276.75	1st Payment
Taxes					€ 50.00	€ 11.50	€ 61.50	
Architects' taxes	€ 10.00	1	5	1	€ 50.00	€ 11.50	€ 61.50	1st Payment
3 Transport of the pieces in the exhibition site					€26.00	€5.98	€31.98	
Pieces transport and exhibition material	€ 3.00	1	1	2	€6.00	€1.38	€7.38	
Transport of pieces to New York assembling	€ 15.00	1	1	1	€15.00	€3.45	€18.45	
Inventory of the boxes during the exhibition	€ 5.00	1	1	1	€5.00	€1.15	€6.15	

4 Travels and accomodation						€ 356.00	€ 55.43	€ 411.43
4.1	Visits of the participants to Amorim					€ 40.00	€ 0.00	€ 40.00
	Travels	€5.00	1	5	1	€25.00	€0.00	€25.00
	Accommodations	€3.00	1	5	1	€15.00	€0.00	€15.00
4.2	Travels of the curator to Amorim for the development					€ 25.00	€ 0.00	€ 25.00
	Voos					€ 25.00	€ 0.00	€ 25.00
	Travels	€5.00	1	5	1	€25.00	€0.00	€25.00
	Accommodations	€3.00	1	10	1	€30.00	€0.00	€30.00
4.3	Technical visits of the curator and the team to New York					€ 120.00	€ 16.10	€ 136.10
	Curator					€ 60.00	€ 8.05	€ 68.05
	Flights	€5.00	1	5	1	€25.00	€0.00	€25.00
	Accommodations	€3.00	2	5	1	€30.00	€6.90	€36.90
	Expenses	€1.00	1	5	1	€5.00	€1.15	€6.15
	Team (e)					€ 60.00	€ 8.05	€ 68.05
	Flights	€5.00	1	5	1	€25.00	€0.00	€25.00
	Accommodations	€3.00	2	5	1	€30.00	€6.90	€36.90
	Expenses	€1.00	1	5	1	€5.00	€1.15	€6.15
4.4	Assembling in New York					€ 125.00	€ 28.75	€ 153.75
	Flights					€ 15.00	€ 3.45	€ 18.45
	Production coordinator	€5.00	1	1	1	€5.00	€1.15	€6.15
	Communication coordinator	€5.00	1	1	1	€5.00	€1.15	€6.15
	Assistant	€5.00	1	1	1	€5.00	€1.15	€6.15
	Alojamento					€ 69.00	€ 15.87	€ 84.87
	Production coordinator	€3.00	9	1	1	€27.00	€6.21	€33.21
	Communication coordinator	€3.00	5	1	1	€15.00	€3.45	€18.45
	Assistant	€3.00	9	1	1	€27.00	€6.21	€33.21
	Other expenses					€ 41.00	€ 9.43	€ 50.43
	Food	€1.00	9	2	1	€18.00	€4.14	€22.14
	Transportation	€1.00	5	1	1	€5.00	€1.15	€6.15
	Communication	€1.00	9	2	1	€18.00	€4.14	€22.14
4.5	Opening					€ 14.00	€ 3.22	€ 17.22
	Flight for the curator	€5.00	1	1	1	€5.00	€1.15	€6.15
	Accommodation for the curator	€3.00	3	1	1	€9.00	€2.07	€11.07
4.6	Disassembling					€ 32.00	€ 7.36	€ 39.36
	Flight					€ 5.00	€ 1.15	€ 6.15
	Production coordinator	€5.00	1	1	1	€5.00	€1.15	€6.15
	Accommodation					€ 12.00	€ 2.76	€ 14.76
	Production coordinator	€3.00	4	1	1	€12.00	€2.76	€14.76
	Other expenses					€ 15.00	€ 3.45	€ 18.45
	Food	€1.00	5	1	1	€5.00	€1.15	€6.15
	Transportation	€1.00	5	1	1	€5.00	€1.15	€6.15
	Communication	€1.00	5	1	1	€5.00	€1.15	€6.15
5 Travels for the participants to the innauguration in New York						€ 14.00	€ 3.22	€ 17.22
5.1	Flights					€ 5.00	€ 1.15	€ 6.15
	Flights architect 1	€0.00	1	1	1	€0.00	€0.00	€0.00 From New York
	Flights architect 2	€0.00	1	1	1	€0.00	€0.00	€0.00 From New York
	Flights architect 3	€0.00	1	1	1	€0.00	€0.00	€0.00 From New York
	Flights architect 4	€0.00	1	1	1	€0.00	€0.00	€0.00 From New York
	Flights architect 5	€5.00	1	1	1	€5.00	€1.15	€6.15
5.2	Accommodation					€ 6.00	€ 1.38	€ 7.38
	Accommodation architect 1	€0.00	1	1	1	€0.00	€0.00	€0.00 From New York
	Accommodation architect 2	€0.00	1	1	1	€0.00	€0.00	€0.00 From New York
	Accommodation architect 3	€0.00	1	1	1	€0.00	€0.00	€0.00 From New York
	Accommodation architect 4	€0.00	1	1	1	€0.00	€0.00	€0.00 From New York
	Accommodation architect 5	€3.00	2	1	1	€6.00	€1.38	€7.38
5.3	Other expenses					€ 3.00	€ 0.69	€ 3.69
	Other expenses architect 1	€0.00	1	1	1	€0.00	€0.00	€0.00 From New York
	Other expenses architect 2	€0.00	1	1	1	€0.00	€0.00	€0.00 From New York
	Other expenses architect 3	€0.00	1	1	1	€0.00	€0.00	€0.00 From New York
	Other expenses architect 4	€0.00	1	1	1	€0.00	€0.00	€0.00 From New York
	Other expenses architect 5	€1.00	3	1	1	€3.00	€0.69	€3.69
6 Production, site and content development						€ 413.00	€ 94.99	€ 507.99
6.1	Production and development of the project					€ 35.00	€ 8.05	€ 43.05
	Sending of the cork samples to the architects	€5.00	1	1	1	€5.00	€1.15	€6.15
	Construction materials	€7.00	5	1	1	€35.00	€8.05	€43.05
6.2	Production and development of the exhibition					€ 306.00	€ 70.38	€ 376.38
	Transport of other materials	€150.00	1	1	1	€150.00	€34.50	€184.50
	Production of the site	€140.00	1	1	1	€140.00	€32.20	€172.20
	Lighting	€1.00	1	1	1	€1.00	€0.23	€1.23
	Audiovisuals	€2.00	1	1	1	€2.00	€0.46	€2.46
	Signs and canvas	€10.00	1	1	1	€10.00	€2.30	€12.30
	General material	€3.00	1	1	1	€3.00	€0.69	€3.69
6.3	Others					€ 72.00	€ 16.56	€ 88.56
	General transportation, communication and taxis during the project	€2.00	1	1	1	€2.00	€0.46	€2.46
	Communication (CTT, phone, internet, printers)	€1.00	1	1	1	€1.00	€0.23	€1.23
	Cleaning, water, electricity	€1.00	1	1	1	€1.00	€0.23	€1.23
	Pieces Licensing and other requests	€20.00	1	1	1	€20.00	€4.60	€24.60
	Security	€46.00	1	1	1	€46.00	€10.58	€56.58
	Other expenses	€2.00	1	1	1	€2.00	€0.46	€2.46
7 Communication and PR						€ 9.00	€ 2.07	€ 11.07
	Leaflets	€1.00	1	1	1	€1.00	€0.23	€1.23
	Photos and videos recording	€5.00	1	1	1	€5.00	€1.15	€6.15
	Innauguration Cocktail	€3.00	1	1	1	€3.00	€0.69	€3.69
8 Unforeseen costs						€ 2.00	€ 0.46	€ 2.46
	Unforeseen costs	€2.00	1	1	1	€2.00	€0.46	€2.46

15) Amorim 2020 - Timeline:

Timeline Amorim 2020



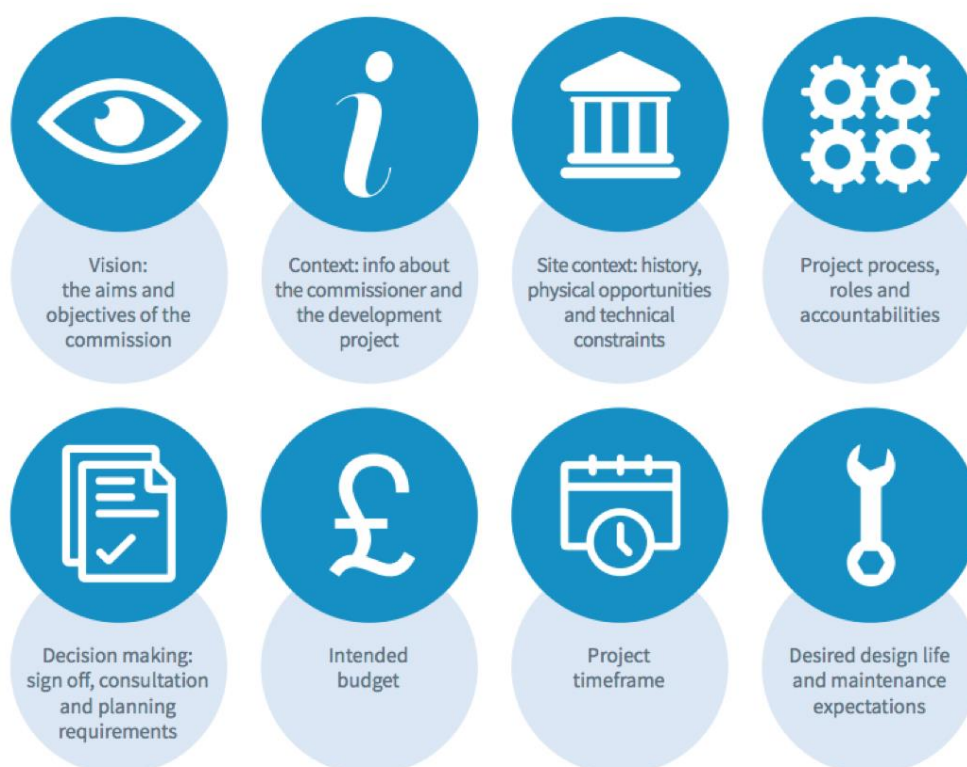
16) Amorim 2020 - Earned value analysis (First 8 months):

			PV		AC		EV		
Center of cost	Axes	Activity	Estimate costs	Expected work to be	Actual costs	Work completed	Planned value	SPI	CPI
AMR/18	Transversal	Transversal Human Resources	€ 1,666.67	33.33%	€ 1,112.30	33.33%	€ 1,666.67	1.00	1.50
AMR/18		Communication and awareness campaign	€ 762.20	12.20%	€ 463.89	10.44%	€ 652.50	0.86	1.41
AMR/18	Axis 1	Research unit over cork in the USA and in Portugal between 1920 and 1980	€ 441.18	17.65%	€ 67.98	15.97%	€ 399.25	0.90	5.87
AMRNY/20	Axis 2	5 Installations in New York	€ 1,860.90	16.54%	€ 2,745.60	14.11%	€ 1,587.38	0.85	0.58
TOTAL			€ 4,730.94	16.85%	€ 4,389.77	15.61%	€ 4,305.79	0.91	0.98

17) British Property Federation and researched by the Contemporary Art Society (2017). A

Guide to commissioning Public Art. [online] Bpf.org.uk. Available at:

<https://www.bpf.org.uk/sites/default/files/resources/Guide-to-commissioning-public-art-web.pdf>



18) LBG Model for design and architectural projects. Developed by the author.

LONDON BENCHMARKING MODEL				
STAKEHOLDERS	INPUTS	OUTPUTS	IMPACTS	
Who? Organisations involved Partners NGOs Society at large Targeted group of people	How? Cash Time In-kind Management costs	Cultural and social Art, design, architecture pieces Educational or social design projects Knowledge production units Book Exhibitions Workshops and seminars Documentaries Environmental Re-usage of waste materials Utilisation of sustainable materials Business Communication campaign Development of relationships with stakeholders Partnerships with public or private institutions Competitive advantage New market or new audience reach	Cultural and social Participations and connections Social integration Quality of life/well being Skills acquisition/personal effectiveness Education Cohesiveness Knowledge production Environmental Ecological awareness Enhancement of sustainability values Business Sales increase over time Uplift in brand awareness Goodwill generation Market penetration Increased knowledge of the market and its actors Development of relationships and connections Media exposure Higher purchase intentions	

19) First Stone evaluative SROI. Elaborated by the author.

PERFORMANCE MEASUREMENT				MONETIZATION Of impacts
IMPACTS First Stone	INDICATORS OF PERFORMANCE	SOURCES Of indicators of performance		
CULTURAL Participations and connections Systematic knowledge around stone New usages of stones in architecture	CULTURAL Event check-ins and attendee satisfaction Stone adoption in design and architecture projects Availability of information about stone Consistency of information about stone Awareness of the portuguese stone industry and its players Awareness of the importance of portuguese stone for the country and its culture	CULTURAL NPS and other surveys Number of cultural pieces produced with portuguese stone Stone usages reports (quantity and purposes) Interviews with designer and achitects about stone Interviews with stone companies about the changes they experienced Media attention towards stone	CULTURAL € € € € € €	
	ENVIRONMENTAL Public awareness Renewable resources adoption Waste genration and waste recycling	ENVIRONMENTAL Surveys, number of environmental educational programs Adoption rate Recycling rate	ENVIRONMENTAL € € €	
	ECONOMIC Sales increase increase in value per m3 of marble Jolift in brand awareness Goodwill generation Development of strategic partnerships between stone companies, local authorities, foreign authorities and other relevant organisations	ECONOMIC Sales figures over time Brand and sponsorship recall Higher purchase intention Media exposure Number of projects or cooperational works done between stone companies, local authorities, foreign authorities and other relevant organisations	ECONOMIC Income statement Media mentions, social media engagement Interviews with stakeholders Governmental reports Market researches Industry reports	ECONOMIC € € € € € €
	Social Returns First Stone Budgeted costs First Stone Evaluating SROI First Stone			

20) LBG Model for Amorim. Developed by the author.

